

Date: Friday, 5/25/2007 8:36:33 AM  
 User: Kim Johnston

## Process Sheet

## POSITIVE RECALL

Customer : CU-DAR001 Dart Helicopters Services  
 Job Number : 32643  
 Estimate Number : 12578  
 P.O. Number : N/A  
 This Issue : 5/25/2007 S.O. No. : N/A  
 Prsht Rev. : NC  
 First Issue : N/A Type : SMALL /MED FAB  
 Previous Run : 31443  
 Written By :  
 Checked & Approved By :  
 Comment : Est Rev:A New Issue 07.05.24 EC

Drawing Name : ARM  
 Drawing Number : D3560 REV.B  
 Project Number : N/A  
 Drawing Revision : B  
 Material : N/A  
 Due Date : 6/5/2007  
 Qty: 30 Um: Each

EFFECTIVE 07.06.05 AUTH 09  
 RELEASED 07.06.05 DATE 09

## Additional Product

Job Number:



Seq. #:	Machine Or Operation:	Description :
1.0	M6061T6B0500X05000	6061-T6 Bar .50" x 5.0"  
	Comment: Qty.: 1.4648 f(s)/Unit Total : 43.9425 f(s) 6061-T6 Bar 0.50" x 5.00" Batch: M17625	M104598 X 20 J.F./SA 07.05.30
2.0	BAND SAW	BAND SAW  
	Comment: BAND SAW Cut blanks 16.750" long	J.F./SA 07.05.30 (30)
3.0	HAAS1	HAAS CNC VERTICAL MACHINING #1  
	Comment: HAAS CNC VERTICAL MACHINING #1	
	1- Mill as per Folio FA693 Rev: AA & Dwg D3560 Rev: B 2-C'sink 0.196" hole on manual mill as per dwg D3560 3-Deburr per dwg D3560	J.F./SA 07.06.01 (20)
4.0	QC2	INSPECT PARTS AS THEY COME OFF MACHINE  
	Comment: INSPECT PARTS AS THEY COME OFF MACHINE	J.F./SA 07.06.01 (20)
5.0	QC8	SECOND CHECK  
	Comment: SECOND CHECK	J.L 07/06/09 20

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector
07.06.06	11	NO POWDER COAT ONLY NO POWDER COAT. CHEM CONV. COAT REF ATTACHED DS EMAIL	JK			JP 07.06.06 per QSI047	
07.06.27	7	PRESS F.I.T Qty 1 D2808 Bushing B# 28600/32752/32896	6				

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes  No  DQA:  Date: 07/07/03  
 QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			
07.05.30	3.0	-1 part scrap. W/o size exmll written on Dolio	JK QSI047	-change Dolio ↳ Done Scrap: replace.	JK 07.05.30 ✓	JK 07.06.28	JK QSI047	JK 07.05.30

NOTE: Date & initial all entries

Date: Friday, 5/25/2007 8:36:34 AM  
User: Kim Johnston

## Process Sheet

Customer: CU-DAR001 Dart Helicopters Services		Drawing Name: ARM
Job Number: 32643		Part Number: D3560041
Job Number:		
Seq. #:	Machine Or Operation:	Description :
6.0	D35921	PLATE
Comment: Qty.: 1.0000 Each(s)/Unit Total : 30.0000 Each(s) PLATE 332661		PL 01-06-21 6
7.0	LARGE FAB 1	LARGE FABRICATION RESOURCE 1
Comment: LARGE FABRICATION RESOURCE 1 1-Weld assembly as per dwg D3560 3104721		Weld Rod PL. 07-06-27 6
8.0	QC5	INSPECT WORK TO CURRENT STEP
Comment: INSPECT WORK TO CURRENT STEP		PL. 07-06-28 ⑥
9.0	QC9	VISUAL WELDING INSPECTION
Comment: VISUAL WELDING INSPECTION		PL 07-06-28 ⑥
10.0	HAND FINISHING1	HAND FINISHING RESOURCE #1
Comment: HAND FINISHING RESOURCE #1 Chemical Conversion Coat as per QSI 005 4.1		PL 07-06-28 ⑥
11.0	POWDER COATING	POWDER COATING NO POWDER COAT SEE W/D CHANGE
		POSITIVE RECALL
Comment: POWDER COATING Powder Coat White Gloss (Ref: 4.3.5.1) as per QSI 005 4.3		PL 07-06-28 ⑥ See Attached E-mail
12.0	QC3	INSPECT POWDER COAT/CHEMICAL CONVERSION
Comment: INSPECT POWDER COAT/CHEMICAL CONVERSION		PL. 07-07-03 6
13.0	PACKAGING 1	PACKAGING RESOURCE #1
Comment: PACKAGING RESOURCE #1 Identify and Stock Location: WA		PL. 07-07-03 6

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

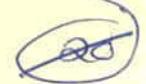
Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
 QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

Date: Friday, 5/25/2007 8:36:34 AM  
User: Kim Johnston

## Process Sheet

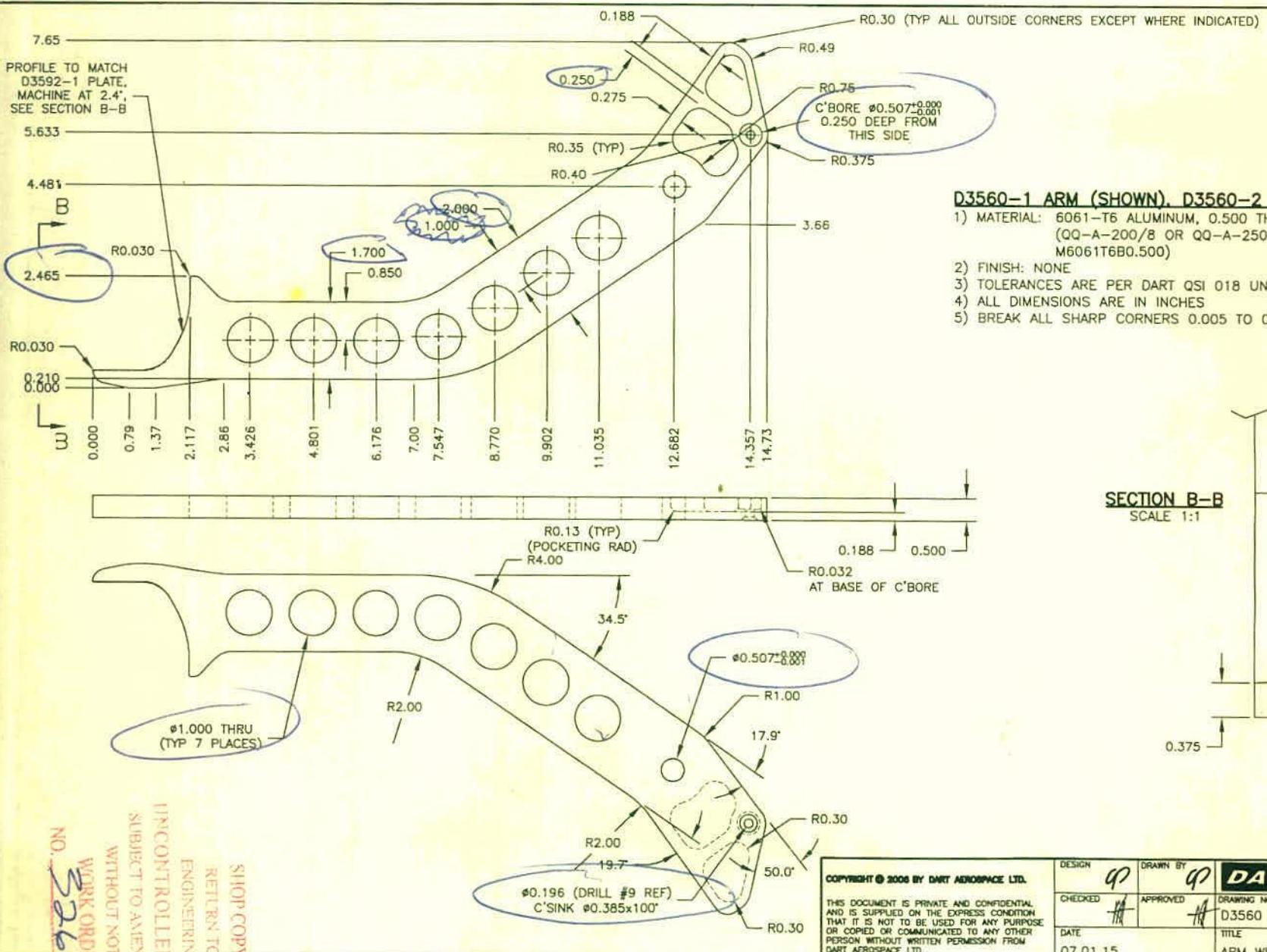
Customer: CU-DAR001 Dart Helicopters Services		Drawing Name: ARM
Job Number: 32643		Part Number: D3560041
Job Number: 		
Seq. #:	Machine Or Operation:	Description :
14.0	QC21 	FINAL INSPECTION/W/O RELEASE   07/07/03
Comment: FINAL INSPECTION/W/O RELEASE		
Job Completion: 		U 07-07-03
<p style="text-align: center;"><b>POSITIVE RECALL</b></p> <p>EFFECTIVE _____ AUTH _____ RELEASED <u>U</u> DATE <del>7-07-03</del></p>		

W/O:		WORK ORDER CHANGES					
DATE	STEP	PROCEDURE CHANGE	By	Date	Qty	Approval Chief Eng / Prod Mgr	Approval QC Inspector

Part No: \_\_\_\_\_ PAR #: \_\_\_\_\_ Fault Category: \_\_\_\_\_ NCR: Yes No DQA: \_\_\_\_\_ Date: \_\_\_\_\_  
 QA: N/C Closed: \_\_\_\_\_ Date: \_\_\_\_\_

NCR:		WORK ORDER NON-CONFORMANCE (NCR)						
DATE	STEP	Description of NC Section A	Corrective Action Section B			Verification Section C	Approval Chief Eng	Approval QC Inspector
			Initial Chief Eng	Action Description Chief Eng	Sign & Date			

NOTE: Date & initial all entries

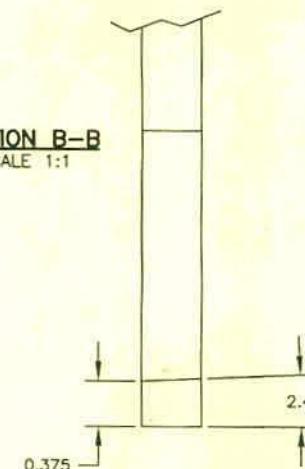


D3560-1 ARM (SHOWN). D3560-2 ARM (OPPOSITE)

- 1) MATERIAL: 6061-T6 ALUMINUM, 0.500 THICK  
(QQ-A-200/8 OR QQ-A-250/11, REF DART SPEC.  
M6061T6B0.500)  
2) FINISH: NONE  
3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED  
4) ALL DIMENSIONS ARE IN INCHES  
5) BREAK ALL SHARP CORNERS 0.005 TO 0.015

SECTION B-B

SCALE 1:



RELEASED

07.05.07. #

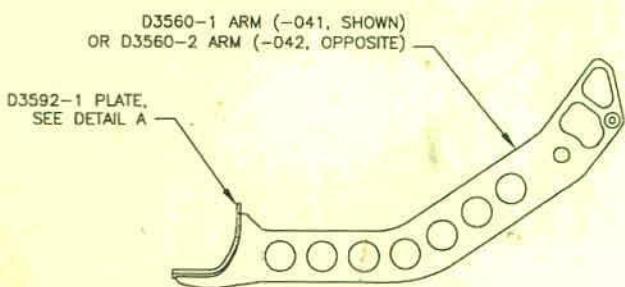
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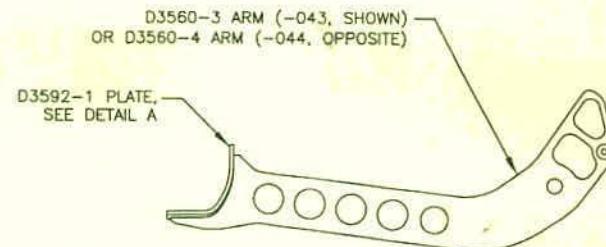
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		DATE 07.01.15		TITLE ARM WELDMENT	SCALE 1:2	

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WITHOUT NOTICE  
WORK ORDER NO. 32643

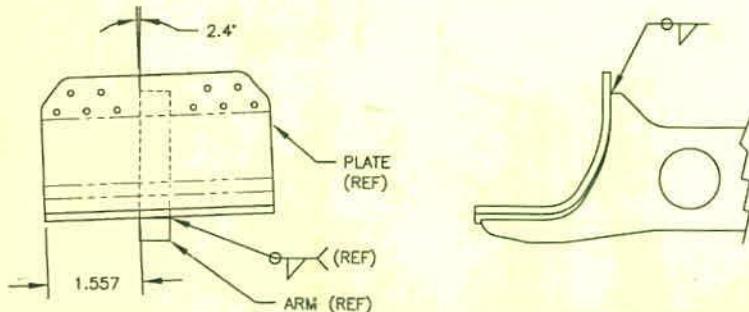




D3560-041 ARM WELDMENT (SHOWN),  
D3560-042 ARM WELDMENT (OPPOSITE)



D3560-043 ARM WELDMENT (SHOWN),  
D3560-044 ARM WELDMENT (OPPOSITE)



**DETAIL A**  
(SCALE 1:1)

**GENERAL NOTES**

- 1) WELD PER QSI 004
- 2) FINISH: CHEMICAL CONVERSION COAT PER DART QSI 005 4.1  
POWDER COAT WHITE (4.3.5.1) PER DART QSI 004 4.3
- 3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) ALL DIMENSIONS ARE IN INCHES

**RELEASED**

07-05-07

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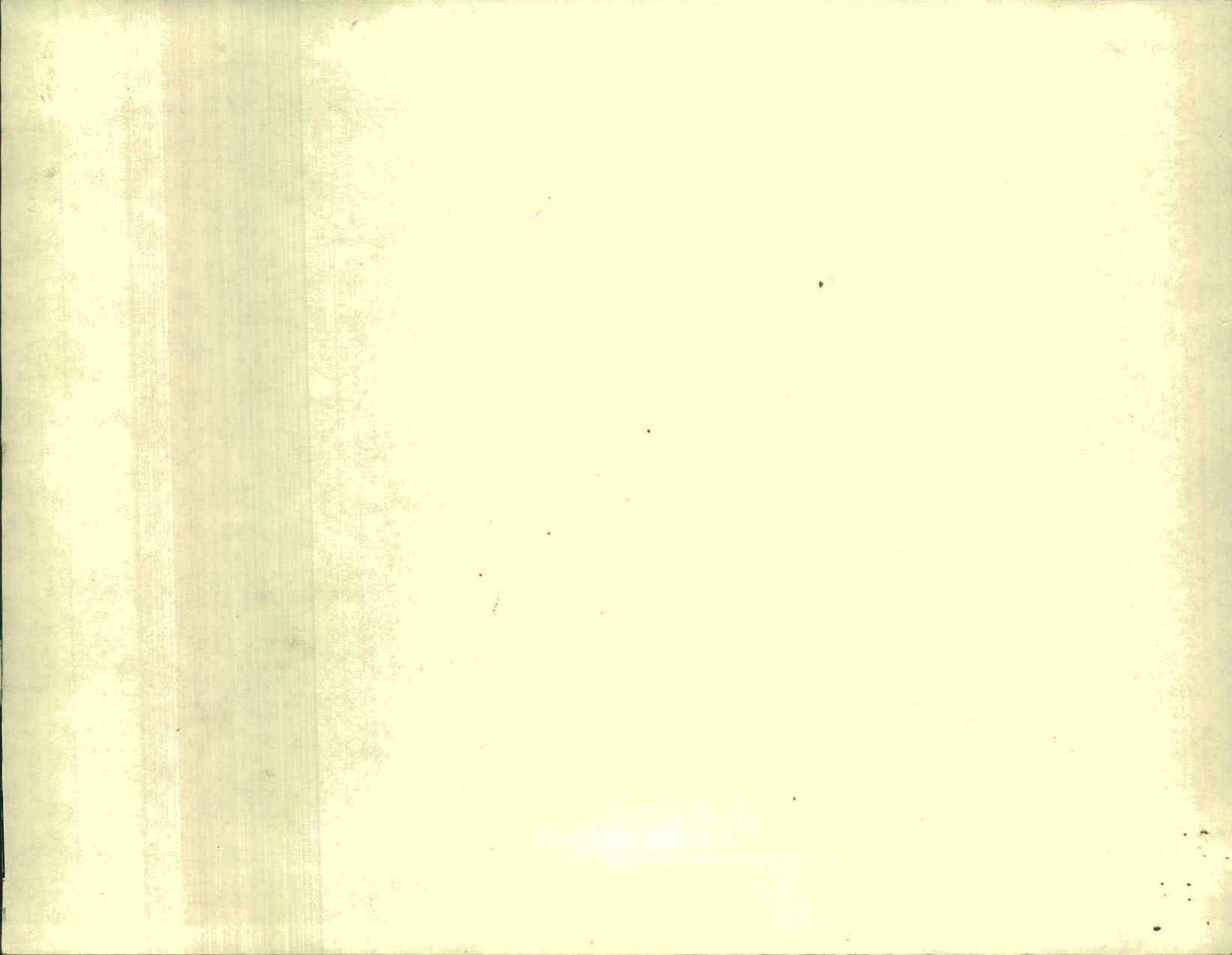
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B	07.01.15	REDESIGN AS WELDMENT, ADD POCKETS
A	06.09.25	NEW ISSUE
DESIGN	9P	DRAWN BY
CHECKED	9P	APPROVED
		DART
		DART AEROSPACE LTD. HANDBURY, ONTARIO, CANADA
		REV. B
		SHEET 1 OF 3
DATE		TITLE
07.01.15		ARM WELDMENT
		SCALE

WORK ORDER NO. 32643

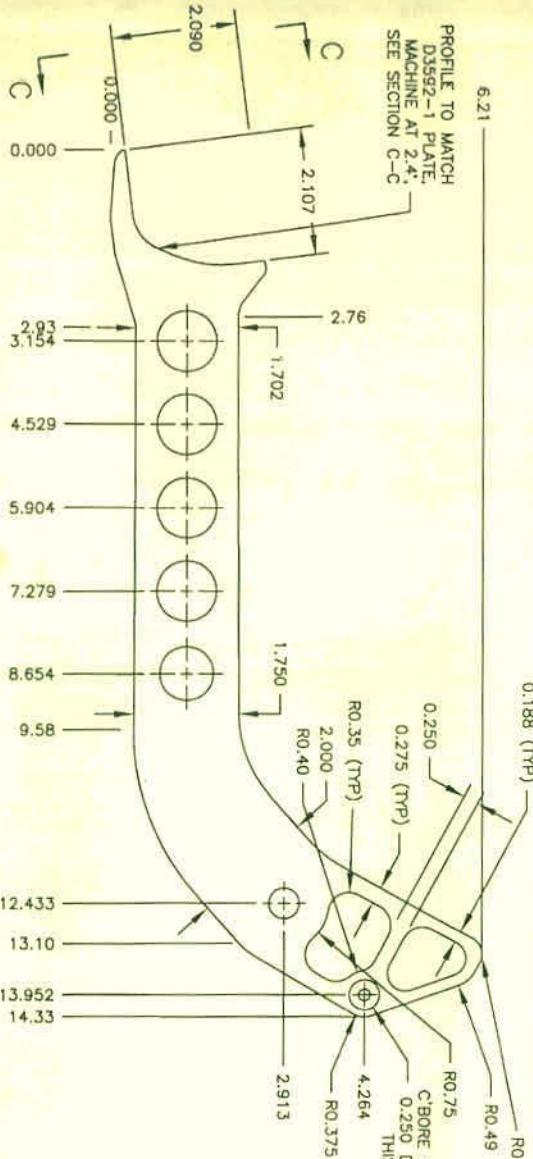
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6.21

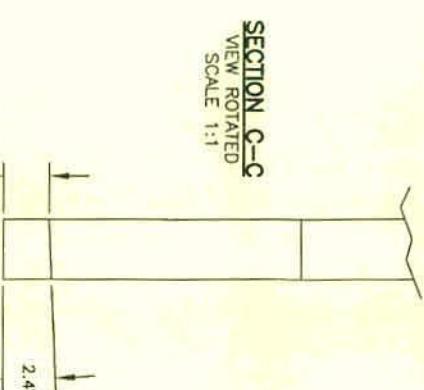
PROFILE TO MATCH  
D3560-1 PLATE  
MACHINE AT 2.4"  
SEE SECTION C-C



### D3560-3 ARM (SHOWN), D3560-4 ARM (OPPOSITE)

- 1) MATERIAL: 6061-T6 ALUMINUM, 0.500 THICK  
(QO-A-200/B OR QO-A-250/11, REF DART SPEC.  
M6061T6B0.500)
- 2) FINISH: NONE
- 3) TOLERANCES ARE PER DART QSI 018 UNLESS OTHERWISE NOTED
- 4) ALL DIMENSIONS ARE IN INCHES
- 5) BREAK ALL SHARP CORNERS 0.005 TO 0.015

**SECTION C-C**  
VIEW ROTATED  
SCALE 1:1



RELEASED  
07 OCT 07

\*1.000 THRU  
(typ 4 PLACES)

\*0.900 THRU  
(1 PLACE)

R2.00 /  
R2.00  
R2.00  
R2.00  
R1.00  
R1.00  
R0.30  
R0.30

0.375  
2.4  
0.375

NO. 32643  
WORK ORDER  
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\*0.196 (DRILL #9 REF)  
C-SINK Ø0.385x10G

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DESIGN	DRAWN BY	APPROVED	DART	DART AEROSPACE LTD. MISSISSAUGA, ONTARIO, CANADA
49	49	49	DART	REV. B DRAWING NO. D3560 SHEET 3 OF 3 SCALE 1:2



DART AEROSPACE LTD	Work Order:	32648
Description: ARM	Part Number:	03560-1
Inspection Dwg: D3560 Rev: B		Page 1 of 1

### FIRST ARTICLE INSPECTION CHECKLIST

First Article     Prototype

Drawing Dimension	Tolerance	Actual Dimension	Accept	Reject	Method of Inspection	Comments
14.73	$\pm .03$	14.73	✓			
.507	$\pm .000$ $-.001$	.507	✓			
.250	$\pm .010$	.250	✓			
.188	..	.188	✓			
.250	..	.250	✓			
.275	..	.275	✓			
.4165	..	.4165	✓			
.2682	..	.2682	✓			
14.73	$\pm .03$	14.73	✓			
4.481	$\pm .010$	4.481	✓			
5.633	..	5.633	✓			
.188	..	.188	✓			
.632	..	.632	✓			
.500	..	.500	✓			
.507	$\pm .000$ $-.001$	.507	✓			
.196	$\pm .005$ $-.001$	.196	✓			
.385 X .100 <sup>a</sup>	$\pm .010$	.385	✓			
Ø1000	$\pm .010$	1.000	✓			
.2000	..	.2000	✓			
1.000	..	1.000	✓			
.375	..	.375	✓			
.13	$\pm .03$	.13	✓			
.850	$\pm .010$	.850	✓			

Measured by:	BG	Audited by:	JL	Prototype Approval:	JP
Date:	07.06.01	Date:	07/06/01	Date:	07.06.01

Rev	Date	Change	Revised by	Approved
A		New Issue	KJ/JLM	

12  
12

## Chris Provencal

**From:** David Shepherd [dshepherd@dartaero.com]  
**Sent:** June 5, 2007 5:18 PM  
**To:** 'Chris Provencal'  
**Subject:** RE: D3562-041/-042

As we have discussed previously, this is acceptable as long as the Magnabond doesn't break down.

David

---

**From:** Chris Provencal [mailto:cprovencal@dartaero.com]  
**Sent:** Tuesday, June 05, 2007 11:00 AM  
**To:** David Shepherd (David Shepherd)  
**Subject:** D3562-041/-042

David

For the D3562-041/-042 step weldment, as discussed. They want to switch from Sikaflex to Magnabond, and powder coat after final assembly.

As part of this change, the D3560-XX arms won't be powder coated, and the D2808 Bushing won't be assembled until after final assembly of the step weldment.

Since this is the first time trying this, we will ensure that the steps are checked after powdercoating in case the Magnabond doesn't anything unexpected (eg. bubbling). If we see anything suspect, we will assemble them the old way.

Is this acceptable.

-Chris

No virus found in this incoming message.

Checked by AVG Free Edition.

Version: 7.5.472 / Virus Database: 269.8.9/834 - Release Date: 6/5/2007 2:38 PM

No virus found in this outgoing message.

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